

REMARKS

Reconsideration of the application is respectfully requested in view of the following responsive remarks. For the Examiner's convenience and reference, Applicant's remarks are presented in the order in which the corresponding issues were raised in the Office Action.

In the Office Action of August 25, 2005 the following actions were taken:

(1) Claims 1-12 were rejected under 35 U.S.C. § 103 as being unpatentable over Japanese Pat. No. 63-061065 (hereinafter "Pentel") in view of U.S. Pat. No. 6,319,309 (hereinafter "Lavery");

(2) Claims 13-18 were rejected under 35 U.S.C. § 103 as being unpatentable over U.S. Pub. No. 2004/0110869 (hereinafter "Denninger") in view of Lavery;

(3) Claims 19-26 were rejected under 35 U.S.C. § 103 as being unpatentable over Denninger in view of Lavery;

It is respectfully submitted that the presently pending claims be allowed based on the remarks below.

Rejections Under 35 U.S.C. § 103

The Examiner has rejected claims 1-26 U.S.C. § 103(a) as being unpatentable over several references.

The issue under § 103 is whether the PTO has stated a case of *prima facie* obviousness. According to the MPEP § 2142, the Examiner has the burden and must establish a case of *prima facie* obviousness. In order to maintain a *prima facie* case of obviousness by combining references, the prior art must provide some reason or motivation to make the claimed compositions. *In re Dillon*, 16 U.S.P.Q.2d 1897, 1901 (Fed. Cir. 1990). As aptly stated in *In re Jones*, 21 U.S.P.Q.2d 1941, 1943-44 (Fed. Cir. 1992):

"Before the PTO may combine the disclosure of two or more prior art references in order to establish *prima facie* obviousness, there must be some suggestion for doing so, found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art... Conspicuously missing from this record is any *evidence*, other than the PTO's speculation (if it be called evidence) that one of ordinary skill in the...art would have been motivated to make the modifications of the prior art necessary to arrive at the claimed (invention)."

It has been widely recognized that virtually every invention is a combination of elements and that most, if not all, of these will be found somewhere in an examination of the prior art. This reasoning lead the court, in *Connell v. Sears, Roebuck & Co.*, 220 U.S.P.Q. 193, 199 (Fed. Cir. 1983) to state:

"...it is common to find elements or features somewhere in the prior art. Moreover, most if not all elements perform their ordained and expected function. The test is whether the claimed invention as a whole, in light of all the teachings of the references in their entirety, would have been obvious to one of ordinary skill in the art at the time the invention was made." (underlining added)

In re Sernaker, 217 U.S.P.Q. 1, 5-6, (Fed. Cir. 1983) states a test to determine whether a rejection of an invention based on a combination of prior art elements is appropriate as follows:

"The lesson of this case appears to be that prior art references in combination do not make an invention obvious unless something in the prior art references would suggest the advantage to be derived from combining their teachings...The board never showed how the teaching of the prior art could be combined to make the invention." (underlining added)

With the above background in mind, the Applicant contends that a *prima facie* case of obviousness with respect to pending claims has not been met. Specifically, the references do not provide sufficient teachings or motivation to be modified or combined in order to arrive at Applicant's invention. Further, Applicant contends that the combination of references is based on hindsight. Therefore, without knowledge of the disclosure of the present invention, one of ordinary skill in the art would not be able to make the combinations proposed to arrive at the claimed invention.

Emphasis on the three independent claims is provided herein, as the Applicant asserts that these claims are all patentably distinct over the prior art. Specifically, the Examiner has rejected claims 1-26 as being obvious in view various combinations of prior art, each of which includes two of the following references: Pentel, Lavery, and Denninger. Thus, a brief discussion of these three key references is believed to be in order.

Pentel

The Examiner references a highlighter ink composition from the Pentel abstract. The Pentel abstract (English translation) suggests that the purpose of the composition is to keep a highlighter pen tip "slightly drying" "even if the cap is kept removed for a long time." (see Abstract). The abstract does not disclose any purpose or intent that the invention was to reduce smearing of highlighted images. The Examiner references the composition as containing: a) a coloring material; b) an organic solvent; and c) an acid compound (including ascorbic acid). However, Pentel does not disclose the pKa range of 2 to 6 as required by the present invention.

Lavery

Lavery teaches of an ink composition that produces a "water fastness printed image." The Examiner stated that Lavery teaches the pKa range of 2 to 6 required by the present invention. However, Lavery teaches water fastness for certain ink composition, not a highlighter composition *per se*. These two types of compositions are clearly distinct and serve two distinct purposes. Ink compositions as disclosed in Lavery are primarily for printing more opaque images on a given substrate. Highlighter compositions typically contain a fluorescent, and are designed to be translucent or transparent, for the purpose of highlighting an existing printed image. Additionally, Lavery relies on the use of polybasic acids; a polybasic acid being an acid that has at least two acidic protons. (see col. 1, lines 37-38).

Denninger

Denninger teaches a highlighter composition that does not smear a printed image upon application. Denninger achieves this with a highlighter composition that includes: a polymer dispersion, polyvalent salts (such as zinc chloride, see Example 1), and water (other dyes, marking agents, additives, and moisture retaining agents are optional) (see paras. [0013] and [0014]). Denninger does not utilize an acid buffer as described and claimed by the Applicant. The Examiner claims that Denninger disclosed the use of succinic acid as a buffer in paragraph [0020] and acetic acid as a buffer in the examples. However, this is incorrect. Denninger discloses the use of succinic acid as a monomer in the polymer particle dispersion (in this case, a polyester) as required by the invention. Specifically, Denninger states

“[s]uitable . . . monomers are . . . succinic acid.” (see [0020]). Additionally, Denninger states the use of acetic acid is to dissolve the zinc oxide (see [0074]), since zinc oxide is clearly insoluble in water. In each example, the acetic acid is used in combination with zinc oxide. Therefore, neither the acetic acid nor the succinic acid were used to create an acid buffer. Furthermore, Denninger does not disclose the use of an acid buffer to reduce mobility of the colorants as argued by the Examiner. Denninger discloses the general mechanism as to how printed images are smeared by highlighters (see [0005]). Denninger then states additional problems (see paras. [0006]-[0008]) and specific cures that are ineffective (see [0009]-[0012]). In fact, Denninger teaches that one such ineffective solution for the smearing problem is to add acid to the highlighter composition, since “the addition of acids unstabilises [sic] the marking liquid itself.” (see para. [0009]).

Claims 1-12

The Examiner rejected claims 1-12 as being unpatentable over Pentel in view of Lavery. There is no motivation to combine a traditional ink composition with a highlighter composition. Pentel teaches of a composition to prevent the tip of a highlighter from completely drying out and Lavery teaches an ink composition that increases water fastness of printed images. The Examiner states “it would have been obvious . . . to modify . . . the highlighter composition of Pentel KK by . . . Lavery et al. in order to get the water fastness and high optical density printed image.” However, such a combination negates the purpose of the present invention. The present invention provides a highlighter composition, which is translucent or transparent, as opposed to a “high optical density printed image.” *Underlining added*. Additionally, Lavery requires a polybasic acid, which negates the use of monobasic acids (acids that have a single acidic proton) as considered by the present invention. As the combination of these references is improper and fails to teach all the elements of the present invention, the Applicant respectfully requests reconsideration of the claims.

Claim 13-18 and 19-26

The Examiner rejected claims 13-18 and 19-26 as being unpatentable over Denninger in view of Lavery. As argued previously, there is no motivation to combine a standard printing ink composition and a highlighter composition, and in this instance, there is specific evidence from the prior art itself that a combination of these two compositions would not work. As discussed previously, Lavery teaches an ink composition that increases water

fastness of printed images through the use of polybasic acids, while Denninger teaches that acids cannot work in a highlighter composition, stating that "[t]he addition of acid however has not proven to be suitable in a practical context as on the one hand dyes frequently react to changes in the pH-value by color changes and on the other hand the addition of acids unstabilises [sic] the marking liquid itself" (see para. [0009]). As Denninger teaches away from Lavery, the combination of these references is improper and fails to teach all the elements of the present invention. Therefore, the Applicant respectfully request reconsideration of the claims.

CONCLUSION


Because there is not adequate motivation or suggestion to modify or combine the references, the Applicant respectfully asserts the Examiner has not satisfied the requirement for establishing a case of *prima facie* obviousness. Therefore, the pending claim set should be allowable. Reconsideration is respectfully requested.

In view of the foregoing, Applicants submit that claims 1-32 present allowable subject matter and allowance is respectfully requested. If any impediment to the allowance of these claims remains after consideration of the above remarks, and such impediment could be removed during a telephone interview, the Examiner is invited to telephone W. Bradley Haymond (Registration No. 35,186) at (541) 715-0159 so that such issues may be resolved as expeditiously as possible.

Please charge any additional fees except for Issue Fee or credit any overpayment to Deposit Account No. 08-2025.

Dated this 23 day of Nov, 2005.

Respectfully submitted,



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